

# PULP & PAPER

## 1985 EDITORIAL INDEX

The 1985 Editorial Index contains complete listings of all feature articles and news stories published in 1985 issues of *Pulp & Paper*. Feature articles are listed by subject, by author, and by company. Feature articles and news stories covering activities outside North America are listed under the name of the country. News stories are listed in the news stories section and also by company. (Note: BG = Buyers Guide, November 15 issue.)

### INDEX OF FEATURE SUBJECTS

#### BLEACHING

Bleaching chemical consumption, prices (column)	Jul 201
Bleaching survey: trends in equipment, chemical use	Jun 56
Chlorination can be optimized with dispersion	Mar 172
Chlorine demand, output grow (column)	Feb 195
Inorganic scale deposits can be controlled	Jun 154
Ion exchange process cuts bleach plant effluent load	Apr 132
L-P upgrades bleach plant at Somoa, Calif.	Jun 77
Peroxide demand to rise with mechanical pulp use	Oct 54
Thiosulfate in bleach plants can be cut	Jun 108

#### CHEMICALS

##### Columns

Chemical Report:	
TiO <sub>2</sub> demand rises	Jan 207
Chlorine output, demand grow	Feb 195
Recycling: suppliers meet individual mill needs	Mar 265
Bleaching chemical consumption, prices	Jul 201
Crude tall oil supply tight	Aug 43
Sulfur prices stable	Sep 43
Kraft chemicals: more specialties hit market	Nov 43
Papermaking: customized products popular	Dec 41
Byproduct recovery cuts effluent at G-P	Oct 155
Chemical survey: consumption modest at U.S. mills	Oct 81
Chemical survey: usage up in Canadian industry	Oct 87
Papermaking chemicals: review of types, uses	Apr 86
Papermaking pigments: annual survey	May 54
Peroxide demand to rise with mechanical pulping	Oct 54
Thiosulfate in bleach plants can be cut	Jun 108

#### COATING/SIZING

Automated coating kitchen at Boise Cascade, Rumford	May 78
Blade size press coater used in Italian mill	May 141
Coater comparisons: Short Dwell vs roll applicator	May 58
Coating kitchen controlled by transmitter	Mar 94
Coatings, filler pigment survey	May 54
Filter delivers high-quality coatings, improved cleaning	Dec 73
Short Dwell coater heads at Champion, Bucksport	Feb 132
Survey finds use of cornstarch changing	Dec 83
Survey identifies coating mill trends	Dec 102
TiO <sub>2</sub> demand on rise (column)	Jan 207
Two-sided coaters vs size presses in Scandinavia	May 120

#### DIRECTORIES/LISTINGS

Chemicals: names of major suppliers	BG 143
-------------------------------------	--------

Equipment and supplies	BG 57
Manufacturers and suppliers	BG 225
Market pulp—producers, agents	BG 199
New Product Showcase	BG 23
Pigment register	BG 42
Replacing equipment: guide to manufacturers	BG 15
Technical and consulting services	BG 175
Top Product Review	BG 33

#### ENGINEERING/MAINTENANCE

##### Columns

Engineer to Engineer:	
Views on personal computers (survey)	Jan 163
Designing your career future	Feb 161
Seeking learning opportunities	Mar 209
Is engineering separate from maintenance?	Apr 197
Designing for maintainability vs reliability	Jun 181
Who does maintenance work in mills? (survey)	Aug 149

##### Special Report

Engineers: Losing the career game?	Sep 54
Student section	
Schools stress early career focus	Sep 56
Humanities courses vs technical fare	Sep 59
Miami Univ. ranks high with alumni, employers	Sep 61
Engineer section:	
Career planning programs shape long-term goals	Sep 94
Engineers dislike image, position, pay	Sep 86
Highest paid engineers in management, marketing	Sep 81
Job hopping helps avoid salary dead end	Sep 97
Manager section	
Engineers at top come from production, sales	Sep 111
Psychological traits of a good manager	Sep 114
Veteran engineers review careers, offer advice	Sep 107
Consultant section	
Changing roles of engineers on consulting side	Sep 127
Industry engineers discuss move into consulting	Sep 123
Moving on: how to write a resume	Sep 130
Alloy composition and corrosion resistance	Dec 104
Bearing selection guidelines for conveyor applications	Dec 56
Belting: guide to manufacturers	BG 15
Boiler deaerator inspections keep operations safe	Aug 111
Bushings: guide to manufacturers	BG 15
Couplings: guide to manufacturers	BG 15
Continuous up-flow filters improve water treatment	Mar 178
Crane design is key aspect of paper machine rebuild	Apr 108

Cylinder facing wire: guide to manufacturers	BG 15
Grout failure can cause paper machine misalignment	Oct 108
High-pressure steam line thermal expansion	Dec 86
Hydraulic drives suited for woodyard, pulp mill	Apr 152
Modern mills designed, built for lower costs	Mar 176
Natural gas price deregulation changes transmissions	Jul 100
Team approach to mill upgrades advocated	Nov 83
Ultrasonic detector reveals flaws, leaks online	Jul '20
Valve selection process reduces maintenance problems	Dec '2
Variable-speed a.c. drives replace d.c. drives	Jun 64

#### ENVIRONMENTAL CONTROL/AIR, WATER QUALITY

Anaerobic pretreatment ups waste treatment output	Apr 66
Anaerobic wastewater treatment is economical	May 122
Cylinder facing wire: guide to manufacturers	BG 15
EPA regulations on storm water, hazardous chemicals	Oct 106
Ion exchange cuts bleach plant effluent load	Apr 132
Mushroom cultivation on pulp mill sludge is possible	Jul 140
Regulations retard paper additive development	Apr 113
Sludge recycled into valuable fertilizer	Apr 130
Sludge thickening system produces solids to 50%	Nov 138
Wet oxidation sludge incineration system at Midtec	Jan 94

#### EXPANSION/MODERNIZATION

Camvac starts up metallized paper plant	Oct 102
Canfor upgrades market pulp line at Howe Sound Pulp	Oct 133
Cascades converts Breakeyville to deinked pulp	Aug 114
Chesapeake's multi-ply linerboard machine	Apr 104
Hammermill's mill is energy independent	Jun 127
Hammermill rebuilds, expands at Lock Haven	Oct 57
Midtec's rebuilt machine (Kimberly, Wis.) runs faster	Mar 169
Mondi starts up world's largest greenfield mill	Aug 91
Mondi's chairman discusses strategy for new mill	Aug 96
Repap building Canada's first LWC mill	Oct 128
SAPPI completes expansion in South Africa	Sep 169
Scott doubles tissue capacity at New Westminster	Jul 96

#### FINISHING/CONVERTING

Automated roll finishing key to Tampella's quality	Oct 152
Bar coding systems offer benefits for inventory	Jun 79
Composite can growth aided by innovations	Oct 110
Hammermill installs new sheeter, wrapping line	Oct 57
Local area networks up finishing room efficiency	Jul 78
Metallized paper expands with Camvac startup	Oct 102
Modern paper warehouse has latest equipment	Oct 125
Senior-size sheeters are still viable today	Oct 60
Supercalender control: review of current strategies	Jun 89
Supercalender control with computers expands	Oct 158
TAPPI Finishing/Converting Conference highlights	Feb 118
Winder-related defects analyzed, evaluated	Feb 102

#### MANAGEMENT

##### Columns

Business Outlook:	
Shrinking kraft paper industry	Mar 45
Beneficial tax proposals	May 41
Whither free trade with Japan?	Jul 43
Tax reform threatens paper industry	Sep 41
Pulp market to have real upturn in 1987	Nov 41
Career Development:	
Meetings improve communications	Jan 153
Attitude surveys	Feb 151
Office conflicts	Mar 199
Untangling technical meetings	Apr 177
More on meetings	May 157
When it is time for a job change	Jun 171
Internal, external career moves	Jul 153
Changing career courses, Part II	Aug 137
Career changes, Part III	Sep 229
Corporate politics	Oct 175
Breaking the "snowed under" cycle	Nov 157
Managing the project nobody wants	Dec 131
From the Editors:	
Paper school curricula problems	Jan 7
Millwide automation not yet reality	Feb 7
Pulp prices come full circle	Mar 7
Coated free sheet—numbers can be deceptive	Apr 7
Open season for paper company takeovers	May 7
Strong dollar hurts paper industry	Jun 7
Linerboard market—what went wrong?	Jul 7

Japan does export paper	Aug 7
Are engineers getting a raw deal?	Sep 7
Wastepaper not garbage to recyclers	Oct 7
Champion International's strategic moves	Nov 7

#### Industry Comment:

Road to economic recovery	Jan 222
Tax proposals threaten paper companies	Feb 208
Canada must act to save wood supply	Mar 280
Canada's paper industry at peak	Apr 264
Swedish forest industry restructured	May 230
Canadian softwood import control problems	Jun 244
Stability, predictability in gas pipeline rates	Jul 218
New tax laws export jobs, not products	Aug 198
Hydroelectric licensing	Sep 328
Merger/takeover mania rapped by union	Oct 240
Lumber battlefield: Canadian view	Nov 226
Takeovers detrimental to industry's health	Dec 180

#### Labor/Management:

Downward spiral in labor settlements	Feb 43
Analysis of pay vs performance	Apr 45
Evolution of the American union	Jun 43
Human resource management in transition	Aug 41
Workers' lot improving without unions	Oct 43
Paper industry labor review for 1985	Dec 39

#### Washington Viewpoint:

Tax plan—analysis of effects	Jan 43
------------------------------	--------

#### Special Reports

##### Outlook 84:

U.S.	
Boxboard holds steady	Jan 64
Coated paper operations strong	Jan 60
Continuation of recovery predicted	Jan 57
Containerboard market tight	Jan 63
Uncoated free-sheet performance spotty	Jan 62
Wastepaper reaches plateau	Jan 65
Canada	
Forecast bright for 1985	Jan 66
Labor demands moderate, negotiations quiet	Jan 75
Market pulp oversupply causes price drop	Jan 74
Newsprint recovery on way	Jan 71
Uncoated groundwood production up	Jan 73
Capital spending survey for U.S., Canada	Jan 109

#### World Review:

1984: U.S. led world pulp and paper producers	Aug 55
Market pulp demand to slow following glut	Aug 123
Mondi's chairman Donner explains strategy	Aug 96
Mondi's new greenfield mill is world's largest	Aug 91
Top 27 producing countries	Aug 56
Africa	Aug 63
Asia/Australia	Aug 57
Europe	Aug 63
Latin America	Aug 59
North America	Aug 64
World industry at a glance	Aug 60

#### Top Management Interview Series

Champion executive team discusses merger, plans	Nov 113
GNN's chairman examines dollar's impact on U.S.	Sep 151
IP's CEO stresses strength, safety, quality	Apr 148
ITT Rayonier's CEO on specialty pulp markets	Aug 108
Mead's Mason and Correll analyze coated market	Feb 98
Mondi's chairman explains Richards Bay strategy	Aug 96
UPIU's Glenn discusses current union goals	May 138
API Paper Week: demand to grow in 1985	May 94
API survey shows capacity additions on rise	Jan 117
Budworm forest damage slowed, not halted	Jan 136
Composite can growth aided by innovations	Oct 110
CPPA technical meeting has 35 sessions	Apr 90
Digester Dash runners raise scholarship money	Feb 138
Engineers salary survey	Mar 118
Europe's wastepaper demand not promising for U.S.	Nov 100
Flexible labor contract ups efficiency at CZ	Jan 130
Japanese quality improvement methods at Federal	Jan 132
Linerboard expansions: rebuild vs greenfield	Sep 186
Natural gas price deregulation has many benefits	Jul 100
Paper Chase raises \$1,600	Nov 74
Personnel-related costs are down (survey)	Jul 57
SP&PSA stresses individual approach to safety	Jul 134
Safety training key in "Right to Know" rule	Jun 134
Salary survey finds median income up 4%	Dec 68
Unbleached kraft markets tighten as capacity slows	Mar 150

## MEETINGS/CONFERENCES

CPPA technical meeting has 35 sessions	Apr 90
IMPC spotlights new technology, first supplier exhibit	Oct 130
SP&PSA meeting: individual is key to safe conditions	Jul 134
TAPPI Finishing/Converting Conference	Feb 116
TAPPI Papermakers Conference	Jul 118
Univ. of Maine stresses improved writing skills	Sep 210

## PAPERMAKING/BOARDMAKING

### Grade Profile

Linerboard	Jan 13
Tissue	Feb 13
Coated free sheet	Mar 13
Uncoated printing/writing free sheet	Apr 13
Coated groundwood paper	May 13
Corrugating medium	Jun 13
Recycled paperboard	Jul 13
Bleached paperboard	Aug 13
Uncoated groundwood paper	Sep 13
Paper-grade chemical market pulp	Oct 13
Unbleached kraft paper	Nov 13
Newsprint	Dec 13
Bacteria is easily controlled in food board	Nov 119
Continuous felt washing cuts machine downtime	Apr 136
Cylinder design: guide to manufacturers	BG 15
Dryer fabric conditioning key to performance	Apr 157
Dryer fabrics designed for maximum permeability	Nov 142
Dryer felt repairs can be done with simple techniques	Oct 161
Dryer improvements lower steam use, sheet breaks	Feb 134
Felt guiding principles—simple changes up performance	Jul 81
Felt installation techniques lengthen clothing life	May 62
Impeller design key to stock agitator efficiency	Sep 156
Machine control centers: 25 years of innovation	Apr 57
Multi-ply linerboard: Chesapeake first in U.S.	Apr 104
Paper machines in year 2000: interview with designers	Jan 130
Papermaking chemicals: review of modern types, uses	Apr 86
Press felts seamed on-machine offer many benefits	Sep 144
Press picking remedies using ASA synthetic sizes	Apr 126
Press sections/felts: new designs yield stronger sheet	Jan 78
Pulp strength can be characterized by single number	Sep 173
Older, smaller machine rebuilds require planning	Jan 90
Roll covers: guide to manufacturers	BG 15
Rope/rope carrier systems: guide to manufacturers	BG 15
Salary, company benefits survey form	Aug 76
Semihydraulic headbox similar to rectifier roll	Sep 207
Shower oscillator prolongs press felt life	Apr 62
Spoiler bars improve dryer efficiency	Mar 66
Suction box covers: guide to manufacturers	BG 15
TAPPI Papermaking Conference: drying technology	Jul 118
Top-wire former design successful at Abitibi-Price	Jun 152
Twin-wire formers have evolved rapidly since 1958	Apr 155
Winder-related defects studied	Feb 102

### POWER/STEAM

Boiler accessories: guide to manufacturers	BG 15
Boiler management system at Austell Box Board	Jul 75
Burners: guide to manufacturers	BG 15
Coal-handling costs reduced at Bowater Southern	Jun 105
Deaerator inspections cut costs at Mosinee	Aug 111
Fluidized bed boilers rapidly gaining acceptance	Jun 59
Low-sulfur coal's impact on boiler operations	Jun 111
Millwide heat recovery cuts steam, natural gas use	Jun 148
Turbogenerator for Hammermill's energy needs	Jun 127

## PROCESS AUTOMATION

### Columns

Automation Update:	
Central control rooms	May 167
Millwide implementation management	Jul 161
Beyond automating log sheets	Sep 245
Pyramid is new symbol for millwide control	Nov 146
Automated roll finishing system at Tampella mill	Oct 152
Bar-coding systems improve data flow, productivity	Jun 79
Boiler operations improved with reporting system	Jul 75
Bottom-up millwide control is cost-effective	Sep 137
CD caliper/moisture control improves copier paper	Feb 84
CD control an industry trend (survey of installations)	Feb 72
CD control system at Potlatch uses infrared radiation	Feb 86
CD moisture controlled with gas-fired infrared system	Feb 88
CD moisture profile controlled by induction heating	Feb 77

Cleaner system analysis done onsite with computers	Jun 114
Coating kitchen automated at Boise Cascade, Rumford	May 78
Coating kitchen with transmitters	Mar 94
Digester control system at Lincoln Pulp & Paper	Aug 74
Digester control with microprocessor at Weyco mill	Oct 62
Fiber length analyzer uses optical method	Nov 69
Groundwood mills benefit from advanced control	May 134
Information gathering system provides vital data	Apr 84
Integrated data and control systems needed	May 74
Japanese control methods help identify mill problems	Jan 132
Leaf River uses three-tier hierarchical control	Sep 140
Local area network improves finishing room efficiency	Jul 78
Machine control centers: 25 years of innovation	Apr 57
Magnetic flowmeter for many pipe sizes	Dec 99
Millwide automation: more theory than reality?	Feb 55
Recovery boiler automated at Alabama River	Apr 81
Self-tuning PID controller cuts pH variations	Jun 94
Supercalender control: review of current systems	Jun 89
Supercalender control with computers expanding	Oct 158
Woodchip classification, weighing at Longview Fibre	Mar 92

## PULPING

### Chemical

Batch pulping advances up efficiency dramatically	Nov 90
Batch pulping: new developments stir interest	Nov 86
Chip thickness screening at Westar	Aug 126
Cross-recovery system successful at Great Lakes	Nov 132
Digester control system at Lincoln Pulp & Paper mill	Aug 74
Filter washer with compaction baffle cuts costs	Nov 65
Green liquor clarification improved with polymers	Sep 212
Hydraulic drives for woodyard, pulp mill	Apr 152
Kiln output improves with inexpensive upgrades	Feb 118
Liquor gun plugging eliminated with grinder unit	Nov 98
Peroxide boosts brightness, stability at Consolidated	Nov 147
Pressure diffusion washer at Great Lakes	May 100
Pulp strength can be characterized by single number	Sep 113
Recovery boiler chemical reactions review	Nov 122
Statistical analysis of chip variations ups pulp quality	Nov 103
Weyco mill controls digester with microprocessor	Oct 62

### Mechanical

Groundwood mills gain with advanced controls	May 134
IMPC Conference focuses on new technology	Oct 130
Low-intensity refining provides better pulp control	May 69
Opc pulping process starts up at Q.N.S. Paper, Que.	Jan 96
Opc pulping system update at Q.N.S. Paper	Nov 72
PGW trials with southern pine at Madison Paper	Sep 190
TMP future outlook is bright	May 91
TMP refiner feed improvements boost efficiency	Sep 192
TMP refining dynamics study	May 115

## RAW MATERIALS/PULPWOOD/FORESTRY

Budworm damage slowed in 1984 but battle rages	Jan 136
Chip thickness screening, slicing system at Westar	Aug 114
Disposable chipper knives improve quality	Jul 112
In-motion car weighing ups wood receiving efficiency	Jul 115
Juvenile wood—increased use requires mill changes	Jul 53
Private land reforestation needs industry commitment	Jul 72
Pulpwood, chip prices stable in 1984, may dip in 1985	Jul 98
Pulpwood cost outlook good, supplies adequate	Jul 92
Woodchip classification system aids in quality control	Mar 92
Wood-handling experts discuss latest technology	Jul 60
Wood-handling trends, developments of past decade	Jul 136
Woodlands management as a long-term investment	Jul 132

## RECYCLING/STOCK PREPARATION

Chemical suppliers focus on individual mills (column)	Feb 263
Cleaner system analysis done onsite with computer	Jun 114
Deinking conversion at Cascades' Breakeville mill	Aug 114
Extractor washing deinking plant for Publishers	Mar 146
Programmable junker key to trash removal	Mar 143
Recycled fiber supply threatened by rules (survey)	Mar 114
Refiner evolution: from open beater to modern disc	Mar 97
Refiner optimization strategies save energy, money	Mar 68
Rule 41 changes affect stock preparation requirements	Mar 89
Stock prep advances up efficiency, lower costs	Mar 120
Stock prep pH controlled with PID at Weyco	Jun 94
Through-flow cleaners operate at high efficiency	Mar 61
Wastepaper demand in Europe not promising for U.S.	Nov 100

# INDEX OF AUTHORS

## -A-

Adams, Debra A.—May 7, Jul 57, Oct 7, Nov 100, Nov 113  
Allan, David R.—Apr 7, Apr 148, Aug 7  
Andrews, Ike M.—Nov 103  
Ash, Raymond H.—May 74  
Aurell, Ron—Sep 186

## -B-

Baird, James D.—Dec 99  
Bajorek, Vic—Dec 52  
Barnes, Richard—Nov 103  
Barnet, Adrian J.—Nov 72  
Bartocci, Stephen J.—Nov 147  
Barton, Robert W.—Jun 108  
Basile, Frank C.—Mar 68  
Baskerville, G.L.—Mar 280  
Baumann, T.W.—Aug 111  
Beckow, Steve—Oct 133  
Bell, Norman E.—Apr 157  
Bendt, H.T.—Nov 119  
Bhasin, Roberta—Jan 153, Feb 151, Mar 199, Apr 177, May 157, Jun 171, Jul 153, Aug 137, Sep 130, Sep 229, Oct 175, Nov 157, Dec 131  
Blackman, Ted—Jul 98, Oct 106  
Blackwell, Brian—Nov 122  
Bliss, Terry—Mar 61  
Bradley, Wallace H.—Jul 75  
Breaux, J.A.—Nov 83  
Breslin, Joanne—Apr 86  
Briscoe, Brian—Aug 126  
Brown, Jeff—Sep 140  
Buffington, Perry W.—Sep 114  
Burchardt, Orjan—Mar 176  
Buzzard, William—Oct 62

## -C-

Caldwell, Peter—Mar 120  
Carlson, Paul E.—Apr 113  
Chalmers, G.J.—Feb 134  
Cianci, William—Jun 79  
Clemons, R.N.—Aug 74  
Clephane, Thomas P.—Feb 208  
Clifford, Mike—Apr 152  
Coleman, Matt—Jan 163, Feb 161, Mar 209, Apr 130, Apr 197, Jun 127, Jun 148, Jun 181, Jul 60, Aug 149, Sep 86, Sep 97, Sep 127, Oct 57, Oct 102, Oct 155  
Constantino, J.—May 115  
Crocco, Bruce—Jul 115  
Cummings, Robyn—Sep 137

## -D-

Davis, Michael J.—Mar 89  
Defoe, R.J.—May 69  
Del Bueno, Richard P.—Jun 59  
DeVries, Tom C.—Sep 156  
Dodson, Michael G.—Oct 55  
Dool, Gary—Jul 78  
Ducey, Michael J.—Feb 86, Feb 88, Feb 132, Mar 114, Mar 265, May 54, May 78, Jun 56, Jun 94, Jul 96, Jul 112, Aug 114, Sep 59, Sep 111, Sep 210, Oct 81, Oct 87, Nov 98, Dec 41, Dec 83  
Dunn, Russell—Jun 105  
Duval, Albert F.—Sep 41  
DuVall, Steven—Mar 92

## -E-

Eaton, Richard R.—Mar 178  
Edmonds, Garland T.—Apr 104  
Eilander, Mark A.—Mar 94  
Ernerfeldt, Bertil—Nov 90  
Espe, Carl—Jan 109  
Evalahti, Osmo—Sep 207  
Evans, John C.W.—Jan 94, Jan 130, Feb 116, Mar 66, Mar 169, Apr 90, May 100, Sep 144, Oct 128, Nov 138

## -F-

Fadum, Ole-Kristian—Feb 55, May 167, Sep 245, Nov 164  
Favre, James F.—Oct 60  
Fery, John B.—Jan 222  
Fitch, James H. Jr.—Apr 132  
Flint, Harry E.—May 62  
Fraik, Robert D.—Sep 61  
Franzen, Rune G.—May 91  
Fredriksson, B.—May 69  
Fremont, J.N.—Oct 108  
Frye, Kenneth G.—Feb 102

## -G-

Gawley, J.R.—Jul 140  
Ghosh, Kanai L.—Apr 81  
Giangiorgi, Bob—Oct 110  
Gignoux, Patrick—May 141  
Gillies, N.P.—Jun 134  
Glenn, Wayne E.—Oct 240  
Goggin, N.J.—May 58  
Graham, Sharlene—Dec 102

## -H-

Habets, L.H.A.—Apr 66  
Hahn, T. Marshall Jr.—Aug 198  
Harris, Thomas K.—Mar 178  
Hart, Howard—Apr 264  
Herrevig, M.T.—May 115  
Hitchings, R.G.—Jul 53  
Houdlette, G.R.—Jun 154  
Hudon, Jim—Apr 62

## -I-

Ibrahim, Ahmed A.—June 114

## -J-

Jackson, Preston L.—Apr 57

## -K-

Kalish, John—Aug 55, Aug 91, Aug 96, Sep 169  
Kellison, R.C.—Jul 53  
Kien, Julian M.—Feb 43, Apr 45, Jun 43, Aug 41, Oct 43, Dec 39  
King, Tracy—Nov 122  
Koffinke, Richard A.—Mar 143  
Kopec, Ricky R.—Apr 136  
Kouk, Robert S.—Oct 55  
Knapick, Edward—Sep 212  
Knelissen, J.H.—Apr 66  
Knowles, R.G.—May 58  
Kuni, Stefan—May 120  
Kurdir, Joseph A.—Mar 97

## -L-

Lanther, Joseph D.—Jul 81  
Larsen, Nancy J.—Jan 136  
Leotta, John—May 141  
Lowe, J.R.—Sep 192  
Luciano, William A.—Nov 142

## -M-

MacDonald, James R.—Jun 111  
MacDonald, Robert N.—Jul 75  
Maehling, Kevin—Jun 105  
Mantravadi, S.V.—Oct 62  
Martin, Fred R.—Jun 77  
Matzka, R.A.—Mar 146  
McCollister, Mark A.—Jan 90  
McInvale, Al—Jul 136  
Mies, Willard E.—Jan 117, Mar 7, Mar 150, Jul 7, Aug 108, Sep 151  
Montani, Raymond—Sep 212  
Morgante, Nino—Oct 125  
Mueller, J.C.—Jul 140  
Mulvihill, Michael J.—Feb 84  
Murphy, John R.—Jul 218  
Murphy, Lee—Jul 136

## -N-

Nettamom Kari—Sep 137  
Norbom, Henning R.—Feb 118  
Nowakowski, Tamara—Sep 212

## -O-

O'Brian, Hugh—Aug 55  
O'Hanlon, Terrence—Jul 120  
Osborne, M.J.—Nov 83  
Oshinowo, O.—Mar 172

## -P-

Pait, Richard—Apr 81  
Palazzolo, S.—Feb 77  
Parker, Graham—Mar 176  
Patrick, Kenneth L.—Jan 7, Sep 7, Sep 123  
Pearson, John—Oct 130  
Penttila, Matti—May 120  
Pessala, Juha—May 134  
Peterson, David J.—Dec 86  
Peterson, Thage G.—May 230  
Pettersson, Bengt—Nov 90  
Pirainen, Raili—Nov 69  
Pollitzer, Stephanie—Jan 109  
Ponkamo, Jukka—Oct 152  
Popovich, Luke—Jan 43  
Presley, J. Richard—Oct 55  
Pu, C.M.—Mar 172  
Puusepp, Jaak—Nov 226

## -R-

Rabideau, John—Jun 152  
Reeve, D.W.—Mar 172  
Rekunen, S.—May 122  
Richards, Stephen B.—Jul 100  
Richardson, J.E.—May 58  
Roberts, J.W.—Nov 132  
Robertson, Fred G.—Nov 41  
Robinson, D.H.—May 69  
Romanski, Eric—Oct 161  
Rouleau, Luc—Nov 72  
Ryan, Thomas—Mar 45



—S—

Salakari, Hannu—Sep 190  
 Samartini, James P.—Jul 132  
 Scalfaratto, Robert E.—Apr 126  
 Shade, Robert A.—Sep 328  
 Shockett, Barry—Jan 207, Feb 195  
 Shotwell, Scott—Jun 244  
 Sigler, Andrew C.—Dec 180  
 Silander, Risto—Nov 86  
 Smith, D.M.—Jun 134  
 Smith, Elizabeth A.—Jul 134  
 Smith, Kenneth E.—Jan 132, Feb 7, Feb 72, Feb 98, May 138, Jun 7, Jun 130, Jul 60, Jul 118, Aug 76, Sep 81, Sep 107, Nov 7, Nov 113, Dec 68

Smith, Preston—Dec 73  
 Smook, Gary—Sep 173  
 Sollosi, Deborah S.—Mar 118, Sep 56, Sep 94  
 Spence, Thomas C.—Dec 104  
 Stiehr, K.A.—Aug 111  
 St-Onge, Ernest A.—Nov 72  
 Sutton, Peter—Aug 55

—T—

Tait, Derek—Nov 65  
 Thielbar, Robert B.—Jun 89  
 Thorp, B.A.—Apr 155  
 Tomskey, Ellis H.—Dec 56  
 Trueb, Richard L.—Sep 186

—V—

Vanhatalo, Antti—Apr 108  
 Verhoeven, Jack—Jun 152

—W—

Walhstrom, P.B.—Jan 78  
 Wallace, Barclay W.—Oct 158  
 Wallinger, R. Scott—Jul 72  
 Walters, W.Z.—Aug 74  
 Wasko, Curtis P.—Jun 64  
 Westergard, Sivert—May 120  
 Whitley, Donald—Nov 147  
 Wilson, Joseph Jr.—Apr 136

# INDEX OF COMPANIES

This index includes both news items and feature stories. News items pertaining to acquisitions/mergers/buyouts, labor, and litigation are not included in this listing but may be found in the News Stories By Category section.

—A—

**ABITIBI-PRICE INC.**

Delays common stock offering Jul 35  
 Gets license to make WSOP Jul 35  
 Sets program for SC production Apr 37  
 Top-wire former successful Jun 152

**ALABAMA RIVER PULP CO.**

Makes 2-millionth ton Apr 33  
 Recovery boiler automated Apr 81

**ALLIED PAPER INC.**

Filters up water treatment Mar 178

**APPLETON PAPERS INC.**

To improve carbonless basestock Aug 33

**AUSTELL BOX BOARD CORP.**

Data systems aid reporting Jul 75

—B—

**BADGER PAPER MILLS INC.**

Plans Wisconsin mill upgrade Jun 31

**BOISE CASCADE CORP.**

Closes Minnesota board plant Jan 37  
 Coating kitchen at Rumford mill May 78  
 Completes carbonless rebuild Aug 33  
 DeRidder to up liner capacity Oct 21  
 Gas-fired radiation drying Feb 88  
 Installs transmitter Mar 94  
 Mulls raising coated capacity Mar 33  
 Wallula's white paper upgrade Sep 23

**BOWATER SOUTHERN PAPER CO.**

Coal handling cuts costs Jun 105  
 Engineers favor team approach Nov 83

**BRITISH COLUMBIA FOREST PRODUCTS LTD.**

Crofton mill installs boiler Nov 29  
 Vetoes LWC upgrade at Blandin Feb 31

**BRUNSWICK PULP & PAPER CO.**

Georgia mill upgrade under way Jan 29

—C—

**CAMVAC INTERNATIONAL**

Ups metallized paper capacity Oct 102

**CANADIAN FOREST PRODUCTS LTD.**

Port Mellon upgrades quality Oct 133

**CASCADES INC.**

Favored for Port Cartier mill Dec 27  
 Starts up deinked pulp mill Aug 114

**CHAMPION INTERNATIONAL CORP.**

Division gets coater heads Feb 132  
 Gas leak at Canton mill Oct 35  
 Machine planned for Skowhegan Apr 23  
 Pensacola mill gets oxygen lines Nov 25  
 Plans carton machine upgrades Nov 31  
 Poised to be top producer Nov 113  
 Quinnesec ahead of schedule May 27  
 Quinnesec gets new machine Jan 29  
 Starts up Bucksport boiler Sep 25  
 To convert Stress Kraft machine Jul 23

**CHESAPEAKE CORP.**

Linerboard machine a U.S. first Apr 104  
 Plans switch to corrugating Feb 31

**CIP INC.**

Newsprint planned for Gatineau Aug 25  
 SC expansion for Trois Rivières Nov 25

**CONSOLIDATED-BATHURST INC.**

Installs TMP mill at Quebec Nov 23  
 To market bleached CTMP Jun 29

**CONSOLIDATED PAPERS INC.**

Completes kraft pulp expansion Oct 21  
 Recycling sludge into fertilizer Apr 130  
 Restructuring wins approval Jul 35

**CONTAINER CORP. OF AMERICA**

Texas carton plant to fold Jan 29

**CRESTBROOK FOREST INDUSTRIES LTD.**

Okays kraft expansion Jan 25  
 Plays host to wild turkeys Aug 37

**CROWN ZELLERBACH CORP.**

Flexible labor contract works Jun 130

—D—

**DOMTAR INC.**

Canada to consider project aid Apr 23  
 Project grows at Windsor, Que. Mar 33

Receives loan for Windsor May 25  
 To convert Dolbeau mill to TMP Aug 29

**DONOHUE INC.**

Government denies aid Nov 23  
 Slates new machine at Clermont Oct 21

**DUNN PAPER CO.**

Port Huron expands C1S capacity Jan 29

—F—

**FEDERAL PAPER BOARD CO.**

Riegelwood's control methods Jan 132  
 Short Dwell trial at Riegelwood May 58  
 To up bleached board output Mar 31

**FORT HOWARD PAPER CO.**

Georgia favored for tissue mill May 25  
 Georgia wins \$1-billion mill Aug 23

**FSC PAPER CORP.**

Recycled newsprint mill for sale Oct 25

—G—

**GEORGIA-PACIFIC CORP.**

Bellingham cuts effluent Oct 155  
 Export pulp price hike Jun 35  
 May buy diaper producer Oct 29  
 Mill cuts steam consumption Jun 148  
 Monticello upgrade for #1 Aug 27  
 Starts up Crossett machine Aug 27  
 Tissue machine sets record Aug 31  
 Triples OSB output at Grenada Sep 33

**GRAYS HARBOR PAPER CO.**

CD control ups paper quality Feb 84

**GREAT LAKES FOREST PRODUCTS LTD.**

Diffusion washer cuts effluent May 100  
 Washington mill planned Jan 25

**GREAT NORTHERN NEKOOSA CORP.**

Chairman discusses markets Sep 151  
 Maine okays hydroelectric dam Nov 29  
 Maine upgrade at \$125 million Mar 29

**GULF STATES PAPER CORP.**

Embarks on Demopolis upgrade Apr 25

—H—

**HAMMERMILL PAPER CO.**

Lock Haven ups finishing output Oct 57  
Lock Haven's energy needs Jun 127

—I—

**INLAND CONTAINER CORP.**

Plans startup of California mill Apr 27

**INTERNATIONAL PAPER CO.**

CEO stresses quality, safety Apr 148  
Offers workers early retirement Jul 33  
Plans bleached board upgrades Jul 25  
Rebuilt free-sheet unit starts up Aug 29  
To install free-sheet machine Jun 31

**ITT RAYONIER INC.**

CEO discusses market pulp Aug 108  
In-motion weighing for wood Jul 115  
May dismantle Port Cartier mill May 27  
Rayonier not for sale now Mar 29  
Timberlands go to partnership Nov 35

—J—

**JAMES RIVER CORP.**

Revamps folding carton plants Sep 35

**JEFFERSON SMURFIT CORP.**

Begins linerboard expansion Nov 23  
Plans Middletown board upgrade Feb 39

—K—

**KIMBERLY-CLARK CORP.**

Dallas wins new headquarters Apr 35  
Diapers gain market share Aug 35  
Introduces newsprint discount Dec 35  
Moves from Wisconsin Jan 31  
Plane in fatal crash Oct 39  
To expand diaper plant Aug 35

—L—

**LAUREL HILL PAPER CO.**

Textile plant converts to tissue Jan 25

**LEAF RIVER FOREST PRODUCTS**

Employees reject UPIU Nov 27  
Hierarchical process control Sep 190

**LINCOLN PULP & PAPER CO. INC.**

Effective alkali control Aug 74

**LINDENMEYER PAPER CORP.**

Donates model to Smithsonian Jul 29

**LONGVIEW FIBRE CO.**

Wood classification system Mar 92

**LOUISIANA-PACIFIC CORP.**

Bleach plant upgrade benefits Jun 77  
EPA requires Ketchikan upgrade Mar 39  
Grinding eliminates plugging Nov 98  
Settles Redwood Park issue Nov 37

—M—

**MACMILLAN BLOEDEL LTD.**

Powell River installs TMP unit May 115

**MADISON PAPER INDUSTRIES**

Pressurized grinding works Sep 190

**MAKIN PULP & PAPER LTD.**

Alberta mill plans progressing Jan 27  
Greenfield mill construction Nov 25  
Publication paper project moved Aug 29

**MANVILLE FOREST PRODUCTS CORP.**

Louisiana upgrade complete Nov 31  
Starts trust for asbestos victims Sep 35  
To expand West Monroe capacity Dec 27

**MEAD CORP.**

Color-imaging process developed Jan 31  
Executives discuss markets Feb 98  
Pulp and paper additions Oct 23

**MIDTEC PAPER CORP.**

Rebuilt machine runs faster Mar 169  
Wet-oxidation sludge disposal Jan 94

**MIRAMICHI PULP & PAPER INC.**

Builds Canada's first LWC mill Oct 128

**MONDI PAPER CO. LTD.**

Donner discusses Richards Bay Aug 96  
Richards Bay greenfield mill Aug 91

**MOSINEE PAPER CORP.**

Deerator inspections for boiler Aug 111  
Plans pulp mill modernization Oct 23  
Sorg to boost toweling output May 27

—N—

**NEENAH PAPER CO.**

Plans expansion at Whiting Apr 25

**NEWTON FALLS PAPER MILL INC.**

Starts up off-machine coater Apr 25

—O—

**OWENS-ILLINOIS INC.**

Adds capacity at Big Island Jan 25

—P—

**PACKAGING CORP. OF AMERICA**

Creates new unit Aug 37  
Plans expansion of linerboard Mar 33

**PENTAIR INC.**

To build greenfield mill 25

**POPE & TALBOT INC.**

Oregon mill strikes "gold" Sep 29  
To upgrade Wisconsin mill Mar 37

**PORT TOWNSEND PAPER CO.**

Proceeds with CTMP financing Feb 33

**POTLATCH CORP.**

Boiler budget cut by \$71 million Jul 27  
Infrared for moisture control Feb 86

**PRINCE ALBERT PULP CO. LTD.**

Considers groundwood machine Jun 31

**PROCTER & GAMBLE PAPER PRODUCTS CO.**

Cuts tissue prices 7.8% Nov 33  
Slates \$500 million for diapers Mar 29

**PUBLISHERS PAPER CO.**

Mill adds deinking plant Mar 146

—Q—

**QUEBECOR INC.**

Plans newsprint mill Nov 25  
To build mill in Matane, Que. Dec 25

**QUEBEC NORTH SHORE PAPER CO. LTD.**

CMP: good chemical replacement Jan 96  
Opco pulping at newsprint mill Nov 72

—S—

**ST. MARYS PAPER CO.**

Moves into groundwood paper Sep 25  
Postpones SC expansion Dec 25

**SAPPI LTD.**

Newsprint expansion done Sep 169

**SCOTT PAPER CO.**

Finishes Mobile energy plant Dec 27  
Introduces narrower towels Jun 39  
Mulls coated paper market Mar 37

**SCOTT PAPER LTD.**

B.C. mill doubles tissue capacity Jul 96

**F.F. SOUCY INC.**

Directory paper trials Mar 31

**SOUTHWEST FOREST INDUSTRIES INC.**

To up containerboard output Mar 29

**SPRUCE FALLS POWER & PAPER CO.**

Retrofits with top-wire formers Jul 27

**STONE CONTAINER CORP.**

Expands plant in Florence Jun 31  
Posted \$30/ton kraft paper hike Aug 37  
To open corrugated plant Jun 37

—T—

**TEMBEC INC.**

Proceeds with CTMP financing Feb 33

—U—

**UNION CAMP CORP.**

Expands slipsheet plant capacity Oct 31  
Starts Franklin mill upgrade Apr 25

**U.S. GYPSUM CO.**

Plans to reorganize operations Feb 33

—W—

**WAUSAU PAPER MILLS CO.**

Plans upgrade at Rhinelander Dec 27  
Sets sulfite pulp expansion Jun 31

**WESTAR TIMBER LTD.**

Chip screening has payback Aug 126

**WESTERN PULP LTD. PARTNERSHIP**

Upgrades at two mills on time Sep 25

**WEYERHAEUSER CO.**

Completes white paper rebuild May 27  
Evaluates ozone bleaching Oct 29  
Self-tuning controller for pH Jun 94

**WILLAMETTE INDUSTRIES INC.**

Adds third boiler at Hawesville Apr 25  
Plants for Georgia, California Jun 37

# INDEX OF FOREIGN COUNTRIES

This index includes both feature stories and news items.

## AUSTRALIA

Newsprint mill plans advance May 37

## AUSTRIA

Laakkirchen plans machine Feb 41  
Leykam plans new machine Feb 41

## BELGIUM

KNP to install LWC machine Feb 41  
KNP to install pulp line Mar 43  
Papeteries de Belgique's TMP Apr 43

## BRAZIL

Brazilian bank switches policy Jul 41  
Considers pulp expansions Nov 39  
PISA starts up newsprint mill Feb 41  
Pulp producer "privatized" May 37  
Suzano to build CTMP mill Dec 37  
Three paper machines start up Sep 39

## CHILE

Arauco upgrades mill Oct 41  
Bids for forestry project rejected Jul 41  
Bids for mill considered Mar 43  
Pulp leads forest exports Nov 39

## CHINA, PEOPLE'S REP.

Boading to build banknote mill Dec 37  
CMP slated for Sahi-Xian Oct 41

## COLOMBIA

Publishers argue over mill Apr 43

## CZECHOSLOVAKIA

Upgrade at Severoslovenské Aug 39

## FED. REP. GERMANY

Albruck upgrades mill Apr 43  
E. Holtzmann slates machine Apr 43  
Feldmühle plans expansions Feb 41  
Felix Schoeller orders machine Sep 39  
Haindl installs LWC machine Dec 37  
Hakle-Werke plans new machine Apr 43

## FINLAND

Enso-Gutzeit gets new woodroom Jan 41  
Gutzeit adds packaging board Aug 39  
Gutzeit proposes joint venture Apr 43  
Gutzeit's coater is versatile May 120  
Joutseno adds batch digester Jan 41  
Kajaani sulfite mill to be closed Jun 41  
Lohjan Paperi converts machine May 39  
Mills plan more market pulp Oct 41  
Oy Kaukas considers U.K. mill Nov 39  
Protest shuts down industry Dec 37  
Schauman to expand capacity 37  
Tampella starts treatment May 122  
United Paper plans machine Apr 43  
United Paper starts machine May 39

## FRANCE

Aid for French pulp mill Jun 41  
Cascades buys French mill Aug 39  
Cellulose de Strasbourg's CTMP Mar 43  
MoDo adds free-sheet capacity Aug 39  
MoDo to upgrade mill Feb 41

## GREECE

Troubled paper mills back up May 37

## INDONESIA

Halts support for new projects Sep 39  
P.T. Aspek starts newsprint mill May 39  
Two greenfield mills for '86 Jan 41

## ISRAEL

American Israeli plans upgrade Sep 39

## ITALY

Court halts leasing for Fabbri Jun 41  
Ministry approves sale Oct 41  
Miliani Paper runs size press May 141

## JAPAN

Contract for Sumatra mill Jun 41  
Mills expand in coated grades Sep 39  
Oji plans oxygen bleaching Mar 43  
Output of acid-free paper up Aug 39  
Plans heat-sensitive papers Jul 41  
Imports chips, pulp from U.S.S.R. Oct 41

## KOREA, REP.

Chonju starts up machine Dec 37

## MALAYSIA

Scott invests in mill Aug 39

## MEXICO

Atenquique ups capacity Jan 41

## NETHERLANDS

KNP, B-T plan venture Mar 43  
Newsprint studied by Parenco May 37  
Pretreatment by Roermond Apr 66

## NEW ZEALAND

Carter Holt buys forests Apr 43  
Tasman plans newsprint upgrade Jan 41  
Tasman to test oxygen bleach Jul 41

## NORWAY

Three newsprint mills join sales May 39

## PAKISTAN

Paper mill okayed at Thatta City Aug 39  
Shifts plan to printing paper mill Nov 39

## SCOTLAND

CTMP can be competitive Nov 39

## SINGAPORE

Scott invests in mill Aug 39

## SOUTH AFRICA

Dissolving pulp exported Sep 39  
Mondi kraft pulp mill starts up Jan 41  
Nampak, S&S start up machines Aug 39  
SAPPI expansion online May 37  
SAPPI sells share in Carlton Dec 37

## SPAIN

Papelera Espanola ups newsprint Oct 41  
Scott Paper buys tissue producer Jan 41

## SWEDEN

Billerud process cuts effluent Apr 132  
Billerud reports two projects May 39  
Billerud studies plans for mills Jul 41  
Djupafor uses coater May 120  
Expanding in linerboard, pulp Oct 41  
Fiskeby to add bleaching Jun 41  
Fiskeby ups bleaching capacity Feb 41  
Gruvön renovates digester Dec 37  
Hylte plans newsprint upgrade Jan 41  
Increases exports to U.S.S.R. May 39  
Kornsnäs-Marma mill may close May 39  
Kornsnäs ups pulp output Sep 39  
MoDo hopes to up capacity Aug 39  
MoDo plans six mill expansions Feb 41  
Munksjö to up tissue output Mar 43  
NCB pulp project for 1986 May 37  
Nymölla installs coater Feb 41  
SCA increases stake in Obbola Dec 37  
SCA starts up new TMP plant Mar 43

## SWITZERLAND

Utzenstorf replaces machine Feb 41

## TAIWAN

Chung Hwa installs machine Apr 43

## TANZANIA

Mufindi mill schedules test run May 39

## THAILAND

Siam Kraft orders Japanese mill Dec 37

## TURKEY

SEKA to modernize mill Mar 43

## UNITED KINGDOM

Deinking planned for Con-Bath Jun 41  
Finnish mill in Wales starts up Jul 41  
Reed restarts machine Aug 39  
Reed to rebuild new machine Jan 41  
Wiggins buys 43% of mill Sep 39  
Wiggins takes share in Soporal Jun 41

## U.S.S.R.

Balakhna plans CTMP for mill Nov 39  
Syktyvkar adds CTMP plants Jan 41  
Syktyvkar to install machines Mar 43

## ZIMBABWE

Orders pulp/paper mill study May 39

# NEWS STORIES BY CATEGORY

This section contains news items not included in the company or country portions of this index.

## ACQUISITIONS/MERGERS/BUYOUTS

Abitibi-Price sale to Gulf Canada proposed	Aug 25
Abitibi-Price to be sold to Gulf Canada	Sep 27
Blandin files for public stock offering	Oct 23
California seeks recycled newsprint mill	May 25
Canadian Forest Products buys Feldmühle's stake	Apr 29
Champion holders approve St. Regis merger	Jan 23
Champion sells three more units	Jun 23
Champion to sell folding carton division	May 23
Champion to sell paperboard mills, carton plants	Jul 31
Champion to sell Tacoma mill, Hennepin Paper	Aug 25
Chesapeake to buy Philip Morris mills for \$214 million	Jun 21
CIP buys remainder of Tahsis	Feb 27
Cleopak Corp. sells can, core plants to employees	Nov 33
Crown Zellerbach faces Goldsmith bid	Feb 25
Crystal Tissue directors okay merger	Feb 27
CZ concedes Goldsmith wins battle	Sep 27
CZ, Goldsmith call truce, agree to restructure	Jul 29
CZ, Goldsmith still waging battle	Jun 21
CZ has 40% captured by Goldsmith	Aug 23
CZ may sell tissue assets to James River	Dec 23
CZ resists Goldsmith's \$1-billion buyout	May 23
CZ unhappy: Goldsmith buys 8.6% of company	Apr 29
Deerfield Specialty Paper employees want to buy mill	Mar 27
Diamond mill purchase studied by former managers	Mar 27
Domtar workers seek purchase of Lebel-Sur-Quevillon	Mar 27
Duluth seeks company to build groundwood mill	Jul 29
Federal Paperboard buys Continental mill	Jan 23
Federal to complete Augusta purchase	Apr 29
G-P sells Lyons Falls, N.Y., mill	Dec 23
IP buys Durham Mills' recycling plant	May 35
IP seeks holder approval of antitakeover steps	May 23
MacMillan Bloedel buys two CCA corrugated plants	Jun 37
Manville agrees to buy Inland's container plants	Nov 31
Marcal Paper Mills acquires Georgia converter	Oct 31
Mobil to study possible sale of CCA	Apr 29
Olin sells Ecusta Paper for \$125 million	Sep 31
Olin to sell Ecusta Paper to First Boston Corp.	Mar 27
Owens-Illinois seeks buyer for Orange, Texas, mill	Apr 35
Pan China bids for Morris, American Packaging mills	Oct 25
Philip Morris considers selling industrial division	Feb 27
Potlatch tries to fend off Belzberg buyout	Dec 21
Rauma-Repola Oy to buy 24% of St. Marys mill	Apr 27
Repap buys Boise mill, breaks ground for LWC facility	Jul 25
Stone Container buys Strong-Robinette Bag Co.	Aug 37
Stone to buy Champion units	Nov 21
Temple-Inland to buy insurance firm	Jun 25
Times Mirror ends talks with Boise on Publishers sale	Apr 29
Times Mirror seeks buyer for Publishers	Feb 25
Trident forms company from Champion purchases	Sep 31
V. Ponte & Sons to buy Whippany mill	May 35
Willamette turns down Onex Capital's buyout offer	Jun 25

## CAPITAL SPENDING

Canadian companies bullish about 1985	Jul 31
R&D spending soars, but industry lags behind	Oct 35
U.S. industry spending to rise 13.6%	Feb 39
U.S. spending boost still on for 1985	Jul 31
U.S. spending plans trimmed	Jun 33
U.S. spending plans raised by 2%	Nov 27
U.S. spending to increase in 1985	Jan 31

## CONVERTED PRODUCTS

Ampad buys stake in Chicago Stock Tab	Oct 31
Ampad to buy James River's Campbell Div.	Aug 37
Austill Packaging Co. is formed	Dec 33
Brown paper bag has many uses	Sep 35
CCA upgrades its Carton Div.	Dec 33
Cascades to sell Sacs de Papier	Dec 33
Central Texas Corrugated to build box plant in Waco	Apr 27
Cleopak sold to Andlinger in \$117-million buyout	Sep 35
Colgate purchases P&C's Boundary line	May 35
Conwed wins support with higher takeover bid	Apr 39
CZ is licensee for Schiffenhaus' PREFlex	Dec 33
Flexo printing could take fifth of newsprint market	Aug 35

Milk carton campaign can continue	Nov 31
Missing kids photos slated for milk cartons	Mar 27
Packoff winner named on East Coast	Jun 31
Papercraft to go private	Dec 33
Smurfit buys Sharick Packaging	Dec 33
Sonoco agrees to buy Continental Fibre Drum	Apr 39
Weyco buys Tri-Wall Inc.	Dec 33

## ENERGY

Scott starts up Mobile energy complex	Dec 27
Solar energy used to preheat boiler water	Aug 35
U.S. mills generated 55% of their energy in 1984	May 33

## ENVIRONMENT/REGULATION

Quebec, Nova Scotia won't spray budworm	Apr 41
Shipping standards proposed by DOT opposed	Feb 39

## FOREST RESOURCES/WOOD PRODUCTS

Big seven wood product companies hint at cost cuts	Jan 37
Canadian lumber exports reconsidered by U.S.	May 35
Jack pine budworm is a spreading pest	Oct 39
Lumber issue brings U.S.-Canada talks, threats	Apr 39
NASA takes trees into Earth's orbit	Oct 23
Pacific Lumber rejects buyout offer	Nov 35
Reagan proposes 13.8% forest budget cut	Apr 41
Southern softwood supply to be short in future	Nov 35
Wasps put sting on forest pest	Aug 29
Weyerhaeuser, IP seek woodworker wage rollbacks	Apr 41

## INTERNATIONAL TRADE

EEC, Canada end duty-free newsprint quota dispute	Feb 37
EEC duty-free newsprint import quota talks resume	Jan 37
EEC fines producers in pulp cartel case	Feb 35
Fibreco Export studying CTMP market pulp mill	Sep 25
ITC dismisses case against Canadian producers	Sep 33
ITC egg-flat probe likely to be delayed	Apr 39
Japan reducing tariffs on some paper, board by 20%	Sep 33
Tariff trade with Japan disappointing	Apr 39
U.S. trade gap in paper products: 4.4 million tons	Oct 33

## LABOR

California Paperboard strike ends	Mar 33
CCA's Brewton, Ala., mill settles	Dec 33
CPU faces slow year—except in converting	Apr 33
CZ's eight-month strike at West Linn will end	Jun 35
CZ lays off 450 woodworkers	Oct 39
CZ strikers at Antioch approve three-year contract	Jan 35
Domtar receives favorable ruling from Quebec court	Jun 37
Domtar signs three-year pact, ends 11-month strike	Jul 39
G-P's Crossett mill up after short walkout	Sep 31
IP labor pact triggers conversion at Pine Bluff	Feb 29
IP workers at Gardiner, Ore., return to work	Jan 35
ITT (Port Angeles) imposes massive wage cuts	Feb 37
IWA members vote down pay deferment	Jun 35
James River offer rejected by electrical workers	May 33
Keyes Fiber hit by walkout	Sep 31
Keyes Fiber mill continues strike	Oct 25
Labor conflicts heat up in wood product mills	May 33
Labor contracts unsettled at year's end	Jan 37
L-P contract settled at Antioch mill	Oct 25
L-P's Ketchikan labor contract offer deadline expires	Mar 35
Madison workers sign five-year contract at Maine mill	Jun 35
PCA's Counce, Tenn., given strike notice	Dec 31
Port Alfred strike ends after four months	Jan 35
Potlatch stops talks at Ransom, Pa.	Dec 33
Owens-Illinois says contract will permit mill upgrade	Sep 31
PRIRB applies for deaccreditation	Jan 35
PRIRB chairman urges cooperation	Dec 31
PRIRB deaccredited by British Columbia labor board	May 31
Scott's Skowhegan mill settles	Dec 31
Simpson ends mill lockout with five-year pact	Oct 27
Simpson workers ratify seven-year contract	Oct 25
Simpson's Fairhaven pulp mill shut down	Jul 39
Simpson's strike ends; West Linn's continues	Apr 33
Southwest Forest Products settles with Panama City	May 31



Union makes major concession in new contract Sep 33  
 Unions, employers to discuss bargaining structure Jun 37  
 UPIU, OCAW boards approve union merger Apr 33  
 West Coast mills still shut by disputes Aug 31  
 Weyco freezes salaries of 9,000 employees Aug 31

#### LITIGATION

Beloit wins Valmet appeal, sues Voith, Chesapeake Mar 35  
 Kruco, Kruger in court over dividends, earnings Feb 39  
 P&G sues K-C for patent infringement of its diapers Sep 37  
 Valmet gets favorable ruling on patent dispute Aug 31

#### MARKETS/PRICES

Canadian domestic paper demand to grow Sep 37  
 Coated free-sheet hike meets no resistance Jan 39  
 Directory market changes with AT&T breakup Apr 37  
 Eroding pulp prices pull down waste grades Apr 35  
 Greenfield pulp mills: not many seen for the 1980s Jul 37  
 LWC mills announce January price increases Jan 39  
 Newsprint consumption slows Jan 39  
 Newsprint outlook for '86 gloomy Dec 35  
 Oversupply, strong dollar prolong slump Feb 23  
 Price-fixing charge appealed Jun 35  
 Pulp markets may be stabilized by downtime May 29  
 Supercalendered price upped by Madison Jan 39  
 U.S. paper, board output up by 5.6% Mar 41  
 U.S. pulp suppliers to remove 2 million tons by '92 Jul 37

Wastepaper prices plunge as pulp market slides May 31  
 Wastepaper slide slows; turnaround expected Jan 39  
 World paper/board capacity to grow slowly to 1989 Oct 37

#### NEW TECHNOLOGY

Cellulose grown in labs, not forests Oct 27  
 Copy-proof paper makes illegal copying difficult Aug 33  
 New digesting process cuts emissions, costs Jun 39  
 New era in newsprint: four-color printing Jan 33  
 Paprican seeks new technological concepts Jun 39

#### SALES/EARNINGS/FINANCE

Beloit studies restructuring, sale, management buyout Nov 21  
 Blandin stock sale off Nov 29  
 Canadian first-quarter earnings increase 535% Jul 33  
 Canadian industry profits up; margins still low in West Apr 31  
 Canadian sales up, profits down Oct 27  
 Dollar blamed for ratings slide of U.S. companies Nov 27  
 First quarter for U.S. flat due to discounting Jun 27  
 IP, Weyco take fourth-quarter charges Feb 33  
 Tax plans unfair says IP president Oct 33  
 Third-quarter profits plunge 43.7% Dec 29  
 U.S. paper industry profits skid 19% Sep 21

#### TRANSPORTATION

Norfolk's Conrail bid wins Dole's approval Apr 41  
 Tenn-Tom waterway now being used by paper mills Jul 39

## MAJOR PAPER MILL LIQUIDATION SALE

### OCEAN FALLS CORPORATION • BRITISH COLUMBIA • CANADA •

WE HAVE BEEN INSTRUCTED BY OCEAN FALLS CORPORATION, TO SELL ALL THEIR MACHINERY & EQUIPMENT AS PART OF PLANS TO NORMALIZE THE MILL COMPLEX & TOWNSITE.

## \$24 MILLION SPENT IN UPGRADING PRIOR TO SHUTDOWN

**PAPER MACHINES** — 2 BAGLEY & SEWALL, 196" TRIM 1600 F.P.M. STD. RIGHT & LEFT HAND FOURD. - 1 - C/W NEW HEADBOX & VENTILATION SYSTEM (COST \$637,000) '80 SECOND GROOVED PRESS (NEVER INSTALLED COST \$750,000) TOTAL CAPITAL EXP. IN 4 YRS PRIOR TO SHUTDOWN \$5,901,000.

**GROUNDWOOD** — 7 - KOEHRING WATEROUS GRINDERS 6 - P/W 3-6000 HP TURBINES 1 - MOTORIZED • **WOODMILL** (LATE MODEL) 2 LINE MILL C/W 3 - DEBARKERS TO 60" • **STEAM PLANT** 3 - BOILERS TOTAL HEATING SURFACE 45,000 SQ. FT. • 4 - STEAM GEN. 14,000 K.W. TOTAL • NUMEROUS TRANSFORMERS & SUBSTATIONS PLUS APPROX. \$800,000 IN NEW SWITCHGEAR & TEC CABLE • TUG & BOOM BOATS • ROLLING STOCK • AUTOMOTIVE, WOODWORKING, MAINT., & MACHINE SHOPS • STORES INVENTORY OF OVER \$1,000,000 • ROLL GRDR & BALANCER • "NEW" PUMPER FIRE TRUCK • "NEW" CARTHAGE 140" 8 KNIFE CHIPPER (COST \$330,000) • OVER 500 ELECTRIC MOTORS TO 2500 HP • NUMEROUS PUMPS • COMPRESSORS • INSTRUMENTATION • BELTING • CONVEYOR • REDUCERS • PLUS MUCH MORE

## HUGE INVENTORY OF EQUIPMENT & PARTS

DETAILED PICTORIAL  
BROCHURE ON REQUEST

EVERYTHING MUST BE SOLD - NO REASONABLE OFFER WILL BE REFUSED

OUR FAX NO. IS VANC. (604) 684-4235 OCEAN FALLS (604) 289-3833

## Maynards INDUSTRIES

VANCOUVER, B.C. V6E 3J6  
(604) 685-7378 1233 WEST GEORGIA ST.

SALE SITE PHONE  
604-289-3355

On Reader Service Card Circle 160